

PATENT COOPERATION TREATY

EO/US
PCT/GB99/03880

PCT

NOTIFICATION OF ELECTION
(PCT Rule 61.2)

From the INTERNATIONAL BUREAU

To:

Assistant Commissioner for Patents
United States Patent and Trademark
Office
Box PCT
Washington, D.C. 20231
ETATS-UNIS D'AMERIQUE

in its capacity as elected Office

Date of mailing: <p style="text-align: center;">02 June 2000 (02.06.00)</p>	
International application No.: <p style="text-align: center;">PCT/GB99/03880</p>	Applicant's or agent's file reference: <p style="text-align: center;">HL70910/001/WS</p>
International filing date: <p style="text-align: center;">19 November 1999 (19.11.99)</p>	Priority date: <p style="text-align: center;">26 November 1998 (26.11.98)</p>
Applicant: <p style="text-align: center;">SMITH, James, Leonard</p>	

1. The designated Office is hereby notified of its election made:

☒ in the demand filed with the International preliminary Examining Authority on:

29 March 2000 (29.03.00)

☐ in a notice effecting later election filed with the International Bureau on:

2. The election ☒ was
☐ was not

made before the expiration of 19 months from the priority date or, where Rule 32 applies, within the time limit under Rule 32.2(b).

<p style="text-align: center;">The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland</p> <p>Facsimile No.: (41-22) 740.14.35</p>	Authorized officer: <p style="text-align: center;">J. Zahra</p> <p>Telephone No.: (41-22) 338.83.38</p>
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PATENT COOPERATION TREATY

From the:
INTERNATIONAL PRELIMINARY EXAMINING AUTHORITY

PCT

WRITTEN OPINION

(PCT Rule 66)

To:

SILVERMAN, Warren
HASSETTINE LAKE & CO.
Imperial House
15-19 Kingsway
London WC2B 6UD
GRANDE BRETAGNE

Date of mailing (day/month/year)	30.11.2000
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Applicant's or agent's file reference HL70910/001/WS	REPLY DUE within 2 month(s) from the above date of mailing
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International application No. PCT/GB99/03880	International filing date (day/month/year) 19/11/1999	Priority date (day/month/year) 26/11/1998
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International Patent Classification (IPC) or both national classification and IPC E04C2/22

Applicant MITIE PLASTICS LIMITED et al.
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1. This written opinion is the first drawn up by this International Preliminary Examining Authority.
2. This opinion contains indications relating to the following items:
 - I ☒ Basis of the opinion
 - II ☐ Priority
 - III ☐ Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
 - IV ☐ Lack of unity of invention
 - V ☒ Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
 - VI ☐ Certain document cited
 - VII ☒ Certain defects in the international application
 - VIII ☒ Certain observations on the international application
3. The applicant is hereby invited to reply to this opinion.

When? See the time limit indicated above. The applicant may, before the expiration of that time limit, request this Authority to grant an extension, see Rule 66.2(d).

How? By submitting a written reply, accompanied, where appropriate, by amendments, according to Rule 66.3. For the form and the language of the amendments, see Rules 66.8 and 66.9.

Also: For an additional opportunity to submit amendments, see Rule 66.4.
For the examiner's obligation to consider amendments and/or arguments, see Rule 66.4 bis.
For an informal communication with the examiner, see Rule 66.6.

If no reply is filed, the international preliminary examination report will be established on the basis of this opinion.
4. The final date by which the international preliminary examination report must be established according to Rule 69.2 is: 26/03/2001.

Name and mailing address of the international preliminary examining authority:  European Patent Office D-80298 Munich Tel. +49 89 2399 - 0 Tx: 523656 epmu d Fax: +49 89 2399 - 4465	Authorized officer / Examiner Cleuziou, Y <hr/> Formalities officer (incl. extension of time limits) Brandt, M Telephone No. +49 89 2399 2926
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I. Basis of the opinion

1. This opinion has been drawn on the basis of (*substitute sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this opinion as "originally filed".*).

Description, pages:

1-13 as originally filed

Claims, No.:

1-17 as originally filed

Drawings, sheets:

1/3-3/3 as originally filed

2. With regard to the **language**, all the elements marked above were available or furnished to this Authority in the language in which the international application was filed, unless otherwise indicated under this item.

These elements were available or furnished to this Authority in the following language: , which is:

- ☐ the language of a translation furnished for the purposes of the international search (under Rule 23.1(b)).
- ☐ the language of publication of the international application (under Rule 48.3(b)).
- ☐ the language of a translation furnished for the purposes of international preliminary examination (under Rule 55.2 and/or 55.3).

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international preliminary examination was carried out on the basis of the sequence listing:

- ☐ contained in the international application in written form.
- ☐ filed together with the international application in computer readable form.
- ☐ furnished subsequently to this Authority in written form.
- ☐ furnished subsequently to this Authority in computer readable form.
- ☐ The statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.
- ☐ The statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

4. The amendments have resulted in the cancellation of:

- ☐ the description, pages:
- ☐ the claims, Nos.:

☐ the drawings, sheets:

5. ☐ This report has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed (Rule 70.2(c)):

(Any replacement sheet containing such amendments must be referred to under item 1 and annexed to this report.)

6. Additional observations, if necessary:

V. Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

1. Statement

Novelty (N)	Claims 1
Inventive step (IS)	Claims 2-17
Industrial applicability (IA)	Claims

2. Citations and explanations
see separate sheet

VII. Certain defects in the international application

The following defects in the form or contents of the international application have been noted:
see separate sheet

VIII. Certain observations on the international application

The following observations on the clarity of the claims, description, and drawings or on the question whether the claims are fully supported by the description, are made:
see separate sheet



**WRITTEN OPINION
SEPARATE SHEET**

International application No. PCT/GB99/03880

Point V

1. Document EP 0 320 745 A (D1), which is considered to represent the most relevant state of the art, discloses (cf. column 3, lines 34-42; figures 3-5) a load bearing structural element from which the subject-matter of claim 1 differs in that the used thermoplastics material has a flexural modulus of 4000 MPa or above.

In D1 the material of the load bearing structural element is a high performance thermoplastic resin, which product normally has a flexural modulus of 4000 MPa or above.

Polyethylene, polypropylene or polyethylene terephthalate are generally known thermoplastics resins, which properties are also well-known and they have a flexural modulus of 4000 MPa or above (cf. for example GB 1 391 622 (D2), page 2, line 48 to page 4, line 72).

Consequently, the thermoplastics resin mentioned in D1 has implicitly a flexural modulus of 4000 MPa or above and the subject matter of claim 1 is not new (Art. 33(2) PCT).

2. Claims 2-17 apparently concern slight constructional changes or the indication of ratios in the load bearing structural element of claim 1 which are generally known, known from D1 or D2 or suggested by D1 and D2 and which comes within the scope of the customary practice followed by persons skilled in the art, especially as the advantages thus achieved can readily be foreseen. Consequently, the subject-matter of claim 2-17, if new lacks an inventive step (Art. 33(2)(3) PCT).

Point VII

Contrary to the requirements of Rule 5.1(a)(ii) PCT, the relevant background-art disclosed in the documents D1, D2 is not mentioned in the description, nor are these documents identified therein.



**WRITTEN OPINION
SEPARATE SHEET**

International application No. PCT/GB99/03880

Point VIII

1. Independent claim 1 is not in the two-part form in accordance with Rule 6.3(b) PCT, which in the present case would be appropriate, with those features known in combination from the prior art (document D1) being placed in the preamble (Rule 6.3(b)(i) PCT) and with the remaining features being included in the characterising part (Rule 6.3(b)(ii) PCT).

It is not clear in claim 3 if the use of parentheses for the unities is a limitation of the protection or not. They should be deleted.

Remarks

It is not at present apparent which part of the application could serve as a basis for a new and inventive claim. Should the applicant nevertheless regard some particular matter as new and inventive, an independent claim should be filed taking account of Rule 6.3 PCT. The applicant should also indicate in the letter of reply the difference of the subject-matter of the new claim 1 vis-à-vis the state of the art and the significance thereof.

The description has to be put in conformity with the new claims as required by Rule 5.1(a)(iii) PCT.

In order to facilitate the examination of the conformity of the amended application with the requirements of Article 34(2)(b) PCT, the applicant is requested to clearly identify the amendments carried out, no matter whether they concern amendments by addition, replacement or deletion, and to indicate the passages of the application as filed on which these amendments are based (see also Rule 66.8(a) PCT).

If the applicant regards it as appropriate these indications could be submitted in handwritten form on a copy of the relevant parts of the application as filed.

PATENT COOPERATION TREATY

From the
INTERNATIONAL PRELIMINARY EXAMINING AUTHORITY

To:

SILVERMAN, Warren
HASSETT LAKE & CO.
Imperial House
15-19 Kingsway
London WC2B 6UD
GRANDE BRETAGNE

PCT

NOTIFICATION OF TRANSMITTAL OF THE INTERNATIONAL PRELIMINARY EXAMINATION REPORT (PCT Rule 71.1)

Date of mailing (day/month/year)	23.02.2001
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Applicant's or agent's file reference HL70910/001/WS	IMPORTANT NOTIFICATION
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International application No. PCT/GB99/03880	International filing date (day/month/year) 19/11/1999	Priority date (day/month/year) 26/11/1998
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Applicant
MITIE PLASTICS LIMITED et al.

1. The applicant is hereby notified that this International Preliminary Examining Authority transmits herewith the international preliminary examination report and its annexes, if any, established on the international application.
2. A copy of the report and its annexes, if any, is being transmitted to the International Bureau for communication to all the elected Offices.
3. Where required by any of the elected Offices, the International Bureau will prepare an English translation of the report (but not of any annexes) and will transmit such translation to those Offices.

4. REMINDER

The applicant must enter the national phase before each elected Office by performing certain acts (filing translations and paying national fees) within 30 months from the priority date (or later in some Offices) (Article 39(1)) (see also the reminder sent by the International Bureau with Form PCT/IB/301).

Where a translation of the international application must be furnished to an elected Office, that translation must contain a translation of any annexes to the international preliminary examination report. It is the applicant's responsibility to prepare and furnish such translation directly to each elected Office concerned.

For further details on the applicable time limits and requirements of the elected Offices, see Volume II of the PCT Applicant's Guide.

Name and mailing address of the IPEA/	Authorized officer
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European Patent Office
D-80298 Munich
Tel. +49 89 2399 - 0 Tx: 523656 epmu d
Fax: +49 89 2399 - 4465

Wicha, M

Tel. +49 89 2399-7281



PATENT COOPERATION TREATY

PCT

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

(PCT Article 36 and Rule 70)

Applicant's or agent's file reference HL70910/001/WS	<div style="display: flex; justify-content: space-between;"> <div>FOR FURTHER ACTION</div> <div>See Notification of Transmittal of International Preliminary Examination Report (Form PCT/IPEA/416)</div> </div>	
International application No. PCT/GB99/03880	International filing date (<i>day/month/year</i>) 19/11/1999	Priority date (<i>day/month/year</i>) 26/11/1998
International Patent Classification (IPC) or national classification and IPC E04C2/22		
Applicant MITIE PLASTICS LIMITED et al.		

1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is transmitted to the applicant according to Article 36.


2. This REPORT consists of a total of 5 sheets, including this cover sheet.

☐ This report is also accompanied by ANNEXES, i.e. sheets of the description, claims and/or drawings which have been amended and are the basis for this report and/or sheets containing rectifications made before this Authority (see Rule 70.16 and Section 607 of the Administrative Instructions under the PCT).

These annexes consist of a total of sheets.

3. This report contains indications relating to the following items:

- I ☒ Basis of the report
- II ☐ Priority
- III ☐ Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- IV ☐ Lack of unity of invention
- V ☒ Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- VI ☐ Certain documents cited
- VII ☒ Certain defects in the international application
- VIII ☒ Certain observations on the international application

Date of submission of the demand 29/03/2000	Date of completion of this report 23.02.2001
Name and mailing address of the international preliminary examining authority:  European Patent Office D-80298 Munich Tel. +49 89 2399 - 0 Tx: 523656 epmu d Fax: +49 89 2399 - 4465	Authorized officer Cleuziou, Y Telephone No. +49 89 2399 2492



**INTERNATIONAL PRELIMINARY
E. EXAMINATION REPORT**

International application No. PCT/GB99/03880

I. Basis of the report

1. This report has been drawn on the basis of *(substitute sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this report as "originally filed" and are not annexed to the report since they do not contain amendments (Rules 70.16 and 70.17).)*:

Description, pages:

1-13 as originally filed

Claims, No.:

1-17 as originally filed

Drawings, sheets:

1/3-3/3 as originally filed

2. With regard to the **language**, all the elements marked above were available or furnished to this Authority in the language in which the international application was filed, unless otherwise indicated under this item.

These elements were available or furnished to this Authority in the following language: , which is:

- ☐ the language of a translation furnished for the purposes of the international search (under Rule 23.1(b)).
- ☐ the language of publication of the international application (under Rule 48.3(b)).
- ☐ the language of a translation furnished for the purposes of international preliminary examination (under Rule 55.2 and/or 55.3).

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international preliminary examination was carried out on the basis of the sequence listing:

- ☐ contained in the international application in written form.
- ☐ filed together with the international application in computer readable form.
- ☐ furnished subsequently to this Authority in written form.
- ☐ furnished subsequently to this Authority in computer readable form.
- ☐ The statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.
- ☐ The statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

4. The amendments have resulted in the cancellation of:

- ☐ the description, pages:
- ☐ the claims, Nos.:

**INTERNATIONAL PRELIMINARY
EXAMINATION REPORT**

International application No. PCT/GB99/03880

☐ the drawings, sheets:

5. ☐ This report has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed (Rule 70.2(c)):

(Any replacement sheet containing such amendments must be referred to under item 1 and annexed to this report.)

6. Additional observations, if necessary:

V. Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

1. Statement

Novelty (N)	Yes: Claims 2-17
	No: Claims 1
Inventive step (IS)	Yes: Claims
	No: Claims 2-17
Industrial applicability (IA)	Yes: Claims 1-17
	No: Claims

2. Citations and explanations
see separate sheet

VII. Certain defects in the international application

The following defects in the form or contents of the international application have been noted:
see separate sheet

VIII. Certain observations on the international application

The following observations on the clarity of the claims, description, and drawings or on the question whether the claims are fully supported by the description, are made:
see separate sheet

Point V

1. Document EP 0 320 745 A (D1), which is considered to represent the most relevant state of the art, discloses (cf. column 3, lines 34-42; figures 3-5) a load bearing structural element from which the subject-matter of claim 1 differs in that the used thermoplastics material has a flexural modulus of 4000 MPa or above.

In D1 the material of the load bearing structural element is a high performance thermoplastic resin, which product normally has a flexural modulus of 4000 MPa or above.

Polyethylene, polypropylene or polyethylene terephthalate are generally known thermoplastics resins, which properties are also well-known and they have a flexural modulus of 4000 MPa or above (cf. for example GB 1 391 622 (D2), page 2, line 48 to page 4, line 72).

Consequently, the thermoplastics resin mentioned in D1 has implicitly a flexural modulus of 4000 MPa or above and the subject matter of claim 1 is not new (Art. 33(2) PCT).

2. Claims 2-17 apparently concern slight constructional changes or the indication of ratios in the load bearing structural element of claim 1 which are generally known, known from D1 or D2 or suggested by D1 and D2 and which comes within the scope of the customary practice followed by persons skilled in the art, especially as the advantages thus achieved can readily be foreseen. Consequently, the subject-matter of claim 2-17, if new lacks an inventive step (Art. 33(2)(3) PCT).

Point VII

Contrary to the requirements of Rule 5.1(a)(ii) PCT, the relevant background art disclosed in the documents D1, D2 is not mentioned in the description, nor are these documents identified therein.

Point VIII

1. Independent claim 1 is not in the two-part form in accordance with Rule 6.3(b) PCT, which in the present case would be appropriate, with those features known in combination from the prior art (document D1) being placed in the preamble (Rule 6.3(b)(i) PCT) and with the remaining features being included in the characterising part (Rule 6.3(b)(ii) PCT).

It not clear in claim 3 if the use of parentheses for the unities is a limitation of the protection or not.

PCT

INTERNATIONAL SEARCH REPORT

(PCT Article 18 and Rules 43 and 44)

Applicant's or agent's file reference HL70910/001/WS	FOR FURTHER ACTION see Notification of Transmittal of International Search Report (Form PCT/ISA/220) as well as, where applicable, item 5 below.	
International application No. PCT/GB 99/ 03880	International filing date (day/month/year) 19/11/1999	(Earliest) Priority Date (day/month/year) 26/11/1998
Applicant MITIE PLASTICS LIMITED et al.		

This International Search Report has been prepared by this International Searching Authority and is transmitted to the applicant according to Article 18. A copy is being transmitted to the International Bureau.

This International Search Report consists of a total of 2 sheets.

☒ It is also accompanied by a copy of each prior art document cited in this report.

1. Basis of the report

- a. With regard to the language, the international search was carried out on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.

☐ the international search was carried out on the basis of a translation of the international application furnished to this Authority (Rule 23.1(b)).

- b. With regard to any nucleotide and/or amino acid sequence disclosed in the international application, the international search was carried out on the basis of the sequence listing :

☐ contained in the international application in written form.

☐ filed together with the international application in computer readable form.

☐ furnished subsequently to this Authority in written form.

☐ furnished subsequently to this Authority in computer readable form.

☐ the statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.

☐ the statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

2. ☐ Certain claims were found unsearchable (See Box I).

3. ☐ Unity of invention is lacking (see Box II).

4. With regard to the title,

☒ the text is approved as submitted by the applicant.

☐ the text has been established by this Authority to read as follows:

5. With regard to the abstract,

☒ the text is approved as submitted by the applicant.

☐ the text has been established, according to Rule 38.2(b), by this Authority as it appears in Box III. The applicant may, within one month from the date of mailing of this international search report, submit comments to this Authority.

6. The figure of the drawings to be published with the abstract is Figure No.

☐ as suggested by the applicant.

☒ because the applicant failed to suggest a figure.

☐ because this figure better characterizes the invention.

1a

☐ None of the figures.

INTERNATIONAL SEARCH REPORT

International Application No

PCT/GB 99/03880

A. CLASSIFICATION OF SUBJECT MATTER

1. C 7 E04C2/22

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 E04C

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	EP 0 320 745 A (BF GOODRICH COMPANY) 21 June 1989 (1989-06-21)	1,2,5-7, 9-12
A	column 3, line 34 - line 42; figures 3-5	15,16
Y	GB 1 391 622 A (TBA INDUSTRIAL PRODUCTS LIMITED) 23 April 1975 (1975-04-23) page 2, line 48 - line 95 page 3, line 25 - line 58	1,2,5-7, 9-12
A	US 5 783 286 A (DINICOLA) 21 July 1998 (1998-07-21) column 7, line 61 - column 8, line 16	8
A	EP 0 795 654 A (ROYAL BUILDING SYSTEMS) 17 September 1997 (1997-09-17) column 5, line 2 - column 6, line 31	13,14,16

☐ Further documents are listed in the continuation of box C.

Patent family members are listed in annex.

* Special categories of cited documents:

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier document but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art

"Z" document member of the same patent family

Date of the actual completion of the international search

15 February 2000

Date of mailing of the international search report

22/02/2000

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax (+31-70) 340-3018

Authorized officer

Mysliwetz, W

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/GB 99/03880

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
EP 320745 A	21-06-1989	AU 2656588 A FI 885715 A JP 1280140 A NO 885459 A PT 89200 A	15-06-1989 12-06-1989 10-11-1989 12-06-1989 14-09-1989
GB 1391622 A	23-04-1975	FR 2183521 A DE 2220297 A GB 1278484 A	21-12-1973 15-11-1973 21-06-1972
US 5783286 A	21-07-1998	NONE	
EP 795654 A	17-09-1997	CA 2097226 A AT 164651 T AU 709600 B AU 3319597 A AU 680251 B AU 6719194 A BG 61952 B BG 100167 A BR 9406665 A WO 9428262 A CN 1127539 A CZ 9503147 A DE 69409378 D DE 69409378 T DK 702742 T EG 20398 A EP 0702742 A ES 2115234 T FI 955513 A HK 1006351 A HU 74280 A, B JP 9505857 T NO 954802 A NZ 266120 A PL 311741 A SG 48835 A SK 146595 A US 5729944 A ZA 9403697 A	29-11-1994 15-04-1998 02-09-1999 20-11-1997 24-07-1997 20-12-1994 30-10-1998 31-07-1996 30-01-1996 08-12-1994 24-07-1996 16-10-1996 07-05-1998 23-07-1998 02-06-1998 28-02-1999 27-03-1996 16-06-1998 10-01-1996 19-02-1999 28-11-1996 10-06-1997 27-11-1995 24-11-1997 18-03-1996 18-05-1989 04-09-1996 24-03-1998 24-01-1995

PCT

INTERNATIONAL SEARCH REPORT

(PCT Article 18 and Rules 43 and 44)

Applicant's or agent's file reference HL70910/001/WS	FOR FURTHER ACTION see Notification of Transmittal of International Search Report (Form PCT/ISA/220) as well as, where applicable, item 5 below.	
International application No. PCT/GB 99/ 03880	International filing date (day/month/year) 19/11/1999	(Earliest) Priority Date (day/month/year) 26/11/1998
Applicant MITIE PLASTICS LIMITED et al.		

This International Search Report has been prepared by this International Searching Authority and is transmitted to the applicant according to Article 18. A copy is being transmitted to the International Bureau.

This International Search Report consists of a total of 2 sheets.

☒ It is also accompanied by a copy of each prior art document cited in this report.

1. Basis of the report

a. With regard to the language, the international search was carried out on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.

☐ the international search was carried out on the basis of a translation of the international application furnished to this Authority (Rule 23.1(b)).

b. With regard to any nucleotide and/or amino acid sequence disclosed in the international application, the international search was carried out on the basis of the sequence listing:

☐ contained in the international application in written form.

☐ filed together with the international application in computer readable form.

☐ furnished subsequently to this Authority in written form.

☐ furnished subsequently to this Authority in computer readable form.

☐ the statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.

☐ the statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished

2. ☐ Certain claims were found unsearchable (See Box I).

3. ☐ Unity of invention is lacking (see Box II).

4. With regard to the title,

☒ the text is approved as submitted by the applicant.

☐ the text has been established by this Authority to read as follows:

5. With regard to the abstract,

☒ the text is approved as submitted by the applicant.

☐ the text has been established, according to Rule 38.2(b), by this Authority as it appears in Box III. The applicant may, within one month from the date of mailing of this international search report, submit comments to this Authority.

6. The figure of the drawings to be published with the abstract is Figure No.

☐ as suggested by the applicant.

☒ because the applicant failed to suggest a figure.

☐ because this figure better characterizes the invention.

1a

☐ None of the figures.

PATENT COOPERATION TREATY

PCT

INTERNATIONAL SEARCH REPORT

(PCT Article 18 and Rules 43 and 44)

Applicant's or agent's file reference AA/AMW/P50178WO	FOR FURTHER ACTION see Notification of Transmittal of International Search Report (Form PCT/ISA/220) as well as, where applicable, item 5 below.	
International application No. PCT/GB 99/ 03915	International filing date (day/month/year) 25/11/1999	(Earliest) Priority Date (day/month/year) 27/11/1998
Applicant SCHNEIDER ELECTRIC LIMITED et al.		

This International Search Report has been prepared by this International Searching Authority and is transmitted to the applicant according to Article 18. A copy is being transmitted to the International Bureau.

This International Search Report consists of a total of 3 sheets.

☒ It is also accompanied by a copy of each prior art document cited in this report.

1. Basis of the report

a. With regard to the language, the international search was carried out on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.

☐ the international search was carried out on the basis of a translation of the international application furnished to this Authority (Rule 23.1(b)).

b. With regard to any nucleotide and/or amino acid sequence disclosed in the international application, the international search was carried out on the basis of the sequence listing:

☐ contained in the international application in written form.

☐ filed together with the international application in computer readable form.

☐ furnished subsequently to this Authority in written form.

☐ furnished subsequently to this Authority in computer readable form.

☐ the statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.

☐ the statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished

2. ☐ Certain claims were found unsearchable (See Box I).

3. ☐ Unity of invention is lacking (see Box II).

4. With regard to the title,

☒ the text is approved as submitted by the applicant.

☐ the text has been established by this Authority to read as follows:

5. With regard to the abstract,

☐ the text is approved as submitted by the applicant.

☒ the text has been established, according to Rule 38.2(b), by this Authority as it appears in Box III. The applicant may, within one month from the date of mailing of this international search report, submit comments to this Authority.

6. The figure of the drawings to be published with the abstract is Figure No.

☐ as suggested by the applicant.

☒ because the applicant failed to suggest a figure.

☐ because this figure better characterizes the invention.

8b _____

☐ None of the figures.

INTERNATIONAL SEARCH REPORT

International application No.

PCT/GB 99/ 03915

Box III TEXT OF THE ABSTRACT (Continuation of item 5 of the first sheet)

Line 1: insert "(110)" after "device".
Line 4: insert "(110)" after "device".

INTERNATIONAL SEARCH REPORT

International Application No

PCT/GB 99/03915

A. CLASSIFICATION OF SUBJECT MATTER
IPC 7 H01H85/02

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 H01H

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the International search (name of data base and, where practical, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	EP 0 127 298 A (Y S SECURITIES LTD) 5 December 1984 (1984-12-05)	1-20
A	the whole document	21-23
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A	the whole document	
A	DE 18 06 152 A (SCHIFFMANN) 14 May 1970 (1970-05-14)	



Further documents are listed in the continuation of box C.



Patent family members are listed in annex.

* Special categories of cited documents:

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Date of the actual completion of the international search

15 February 2000

Date of mailing of the international search report

22/02/2000

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax (+31-70) 340-3018

Authorized officer

Desmet, W

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/GB 99/03915

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
EP 0127298 A	05-12-1984	AT 39036 T AU 553034 B AU 2686584 A CA 1214190 A DE 3475457 A GB 2141295 A, B JP 1691107 C JP 3059643 B JP 60035908 A NZ 207903 A SG 51187 G US 4555602 A ZA 8402832 A	15-12-1988 03-07-1986 25-10-1984 18-11-1986 05-01-1989 12-12-1984 27-08-1992 11-09-1991 23-02-1985 08-01-1988 16-09-1988 26-11-1985 28-11-1984
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INTERNATIONAL SEARCH REPORT

International Application No

PCT/GB 99/03880

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 E04C2/22

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 E04C

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	EP 0 320 745 A (BF GOODRICH COMPANY) 21 June 1989 (1989-06-21)	1,2,5-7, 9-12
A	column 3, line 34 - line 42; figures 3-5	15,16
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A	EP 0 795 654 A (ROYAL BUILDING SYSTEMS) 17 September 1997 (1997-09-17) column 5, line 2 - column 6, line 31	13,14,16

☐ Further documents are listed in the continuation of box C.

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European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
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INTERNATIONAL SEARCH REPORT

Information on patent family members

Internat. AI Application No

PCT/GB 99/03880

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